

Abstract

Processing of image data relating to moving scenarios, especially for recognizing and tracking objects located therein, requires identifying corresponding pixels or image areas in the individual successive image data sets. Likewise, processing of stereo images requires identifying the data areas which correspond to each other in two images that are recorded substantially at the same time from different angles of vision. According to the novel method of analyzing correspondences in image data sets, the image data sets that are to be compared are transformed using a signature operator such that a signature string is calculated for each pixel and is stored in a signature table allocated to the individual image data sets along with the pixel coordinates in a first step. A correspondence hypothesis is then generated for the signature strings identified in both tables and is stored in a list of hypothesis is then generated for the signature strings identified in both tables and is stored in a list of hypotheses for further processing. The inventive method advantageously makes it possible to analyze correspondences in a very efficient manner regarding the computing time while allowing fast processing of image pairs even when individual objects are presented at very different points in the two data sets.